Omaha's leadership in information technology has been enabled by one of the strongest telecommunications infrastructures in the nation with access to major north, south, east and west fiber optics networks, multiple points of presence and direct high-capacity connections. Reliable, state-of-the-art equipment assures that telecommunications transmissions run smoothly and accurately throughout the metro area as well as into and out of the city.

But while Omaha's economy continues to grow because of increased broadband investment, most of rural Nebraska continues to struggle to keep up in an increasingly connected world. These broadband challenges are not unique to rural Nebraska. As more services including healthcare, education, and e-commerce rapidly move to broadband, millions of Americans in unserved markets are missing the opportunity to participate in this necessary sphere. Also, as globalization substantially increases competition for high-wage jobs and professional services, continued U.S. economic expansion demands that all Americans participate in the worldwide marketplace, something impossible without affordable access to broadband.

There are numerous success stories about rural communities in Nebraska that have been greatly affected by having access to broadband.

An entrepreneur from Verdigre, Nebraska (population 519 in northwest Nebraska) who does work for Boeing designing computer chips is able to use the high capacity fiber to the home network in Verdigre to video conference in real time with other Boeing employees in Seattle and around the world without ever leaving the good life of small town U.S.A.

Nebraska is also seen as a leader and innovator for using broadband to expand educational opportunities to K-12 schools throughout the state. Thanks to federal and state funds, some of which come from the federal Universal Service Fund in partnership with the local telecommunication company's civic and corporate dedication, it's not uncommon to have schools being supplied with speeds up to 40 megabits-per-second. Such speeds allow kids and teachers in communities like Indianola, Nebraska (population 642) and Rushville, Nebraska (population 1,100 and 312 miles from Denver, 450 miles to Omaha, and 130 miles to Rapid City, S.D.) to expand their educational opportunities and retain teachers and salaries in small towns.

Nebraskans have also used broadband as a new tool to reenergize and rebuild the main streets that have been abandoned over the years. A veterinarian in Ewing, Nebraska (population 433) uses broadband to diagnose animals around the world. And my favorite success story is that of

a small meat locker in Diller, Nebraska who now sells boxed beef around the country out of their store front on Main Street in Diller due to their high speed connection.

While the stories highlight what Nebraskans are capable of if they have broadband, the reality is that only 90% of Nebraskans have access to high-speed broadband.

It is imperative that Congress and the FCC commit to policies that will deliver broadband to all Americans and as the Vice Chairman of the Subcommittee on Communications and Technology I strive to achieve this goal.

During the 111th Congress, I authored legislation entitled The Local Community Radio Act of 2010 which was enacted into law (Public Law No: 111-371.) The law will promote community radio through the licensing of low power FM (LPFM) and FM translator stations throughout the country. I expect up to ten new LPFM stations to be made available in the Omaha area because of this law.

Other 21st century telecommunications issues in which I have been working on include spectrum, universal service, net-neutrality, data security and privacy.
Spectrum

Good spectrum policy can help bring interoperable broadband communications to public safety officials, advance wireless broadband service, reduce the deficit by tens of billions of dollars, and create jobs. The Digital Television Transition and Public Safety Act of 2005, for example, cleared 24 MHz of nationwide spectrum for First Responders to meet some of the 9/11 Commission recommendations, provided $1 billion for interoperable public safety equipment, freed spectrum that carriers are now using to roll out fourth generation wireless broadband services, and raised close to $20 billion in spectrum auction proceeds.

Despite the progress the legislation made, however, we still do not have a nationwide, interoperable public safety network, and consumer demand for wireless broadband is rapidly outpacing the amount of spectrum available for commercial use. All told, we have allocated approximately 100 MHz of nationwide spectrum for public safety use and a June 23, 2011, Congressional Research Service report estimates we have given First Responders $13 billion in federal funding over the last decade.

We are currently working on legislation that authorizes an as yet unspecified amount for construction of an interoperable public safety network on the 24 MHz of spectrum cleared for public safety by the 2005 DTV legislation, creates a governance structure for construction and operation of the public safety network, and authorizes broadcast incentive auctions. Deficit reduction estimates for such proposals range between $15-30 billion.

Universal Service Reform

Over the last eight years in Congress I have worked extensively on legislation that would reform the High-Cost portion of the Universal Service Fund program. The High Cost Program ensures that consumers in all regions of the Nation have access to and pay rates for telecommunications services that are reasonably comparable to those in urban areas. The primary participants in the High Cost Program are rural incumbent local exchange carriers and competitors that serve customers in the service areas of incumbent carriers. Other key stakeholders include state regulators, telecom consultants, legislators, and federal agencies. Without High Cost support, consumers in high cost areas would pay significantly more for service due to factors such as dense terrain or sparse population, which raise the cost of building telecommunications networks.

On February 8th, the FCC adopted a Notice of Proposed Rulemaking (NPRM) on USF and intercarrier compensation (ICC) reform starting a shot clock on the comment portion of the proceeding. This rulemaking is a comprehensive approach to reforming the Universal Service Fund that seeks to provide a predictable transition path for High-Cost Universal Service support, as well as to develop a unified ICC regime that is suitable for the 21st century.

The NPRM originally caused great concern among the rural telecommunications industry for a number of reasons, including proposed ideas on reverse auctions and rate-of-return regulation, but due to pressure from my office, we were able to help shape the order in a way that it is more palatable for rural providers and ultimately better for rural consumers like those in the state of Nebraska.

Net Neutrality

It is no coincidence that today's internet users can access anything they want very quickly and easily. This has been made possible due to our historical hands-off approach to the internet. As users demand more sophisticated content, service and applications we must maintain a similar course or face the inevitable decline in investment, service and an overall blow to our economy.

I am worried that the FCC's adoption of its network neutrality rules regulating the Internet will do just that and am further concerned that they were adopted strictly on the speculation of future harm.

On October 5, 2009 my colleagues and I sent a letter asking that the Commission undertake a full market analysis prior to any consideration of network neutrality rules. It is made clear in the order that no such analysis took place. Instead, the order selectively applies the rules to broadband providers while shielding web-based companies. Why did the Commission, instead of promoting competition, decide it was more appropriate to pick winners and losers. If the mere threat of Internet discrimination is such a concern, and if the FCC has done no analysis to demonstrate why one company has more market power than another, why would discrimination by companies like Google or Skype be any more acceptable than discrimination by companies like Verizon and Cox?

According to a December 2010 editorial by Dr. David J. Farber, grandfather of the Internet, the FCC's "order will sweep broadband ISPs, and potentially the entire Internet, into the Big Tent of Regulation. What does this mean? ...Customer needs take second place and a previously innovative and vibrant industry becomes a creature of government rule-making." The Commissions adoption of the Net Neutrality order will also make it harder for upstarts with fewer resources to compete with web incumbents, which are better at influencing the regulatory agencies.

How carriers manage their networks and negotiate arrangements should be determined by engineers, entrepreneurs and consumers in the marketplace, not by as few as three unelected FCC commissioners.

Data Security/ Privacy

Needless to say, we live in an era in which our personally identifiable information – such as financial, health, geographic, and otherwise – exists primarily as bits and bytes in various locations and databases across an interconnected information economy. Consumers have benefited enormously from the aggregation and use of this data by firms who have transformed it into highly popular products and services that would never be possible were it not for the existence of certain – usually anonymous – pieces of information in the first place.

The ability for an online retailer to showcase items of interest to a customer based on their past shopping habits or the opportunity to stand in the middle of a city and use mapping and reference services to suggest a good restaurant – and maybe even offer a discount – based on your location are both examples of the value-adding potential of the internet when it is free from stifling regulation that robs it of innovation.

Of course, a balance must be struck to ensure consumers' information is not abused and that they are aware of what information they are giving out and when. The ability to opt-out when one wants to is imperative in this regard. In general, however, we must be careful to ensure whatever we do in Congress doesn't harm our consumers' freedom to engage and use an internet innovative enough to provide the services they want, demand, and even need.